Growing Greener

Conservation by Design

Communities across Pennsylvania are preserving their special open spaces, greenways and natural resources at the same time they achieve their development objectives. How? Conservation through local zoning and subdivision ordinances; an approach we call *Growing Greener: Conservation by Design*. If you want to ensure that new development creates more livable communities, the *Growing Greener: Conservation by Design* approach might be right for you.

"This is how the process should work!"

Guy Smith, Municipal Solicitor

Growing Greener: Conservation by Design

This booklet summarizes how municipalities can use the development process to their advantage to protect interconnected networks of open space: natural areas, greenways, trails and recreational lands. Communities **can** take control of their destinies so that their conservation goals are achieved in a manner fair to all parties concerned. All that is needed are some relatively straightforward amendments to municipal comprehensive plans, zoning ordinances and subdivision ordinances. These steps are described on the pages that follow.

Growing Greener: Conservation by Design is a collaborative program of the Pennsylvania Department of Conservation and Natural Resources (DCNR) and Natural Lands Trust, a regional land conservancy located in Media, PA. Since 1997, over 26% of the municipalities in Pennsylvania's fastest growing counties have participated in the *Growing Greener: Conservation by Design* program and of those participants, 34% have adopted rigorous versions of ordinances. The communities that adopt the *Growing Greener: Conservation by Design* ordinances are preserving an average of 62% of residential land, each time a property is developed, extending their green footprint across the Commonwealth.

How Do I Learn More?

The following services are available in Pennsylvania:

(1) educational workshops, held at the county and regional level, for local officials, developers and others involved in making land use decisions; and presentations at conferences;

(2) technical assistance for communities—primarily in the form of assessments of land use regulations, ordinance assistance and design services; and

(3) training for professionals interested in learning how to write the ordinances and use the design methods that implement the *Growing Greener: Conservation by Design* standards.

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Putting Conservation into Local Codes

The Conservation Design Concept

Each time a property is developed into a residential subdivision, an opportunity exists for adding land to a community-wide network of open space. Although few municipalities take advantage of this opportunity, this situation could be reversed by making several small but significant changes to three basic local land-use documents—the comprehensive plan, the zoning ordinance and the subdivision and land development ordinance. Simply stated, Conservation Design rearranges the development on each parcel as it is being planned so that half (or more) of the buildable land is set aside as open space. Without controversial "down zoning," the same number of homes can be built in a less land-consumptive manner, allowing the balance of the property to be permanently protected and added to an interconnected network of community green spaces. This "density-neutral" approach provides a fair and equitable way to balance conservation and development objectives.

Recently planted saplings will eventually restore a woodland edge along the stream. The white tubes protect the saplings from deer browse.

Figure 1

London Grove Township, Chester County uses both selective acquisition and their Growing Greener codes to implement its Greenway and Trails Plan. The plan on the left shows three parcels along tributaries to the White Clay Creek, designated an "Exceptional Value" stream under the federal Wild & Scenic Rivers program. The Township acquired the darkest green parcel with County grant funds and a conservation subdivision developer donated the hatched parcel, at no cost to the Township. Two homeowners' associations own and maintain the conservation subdivision open space. A public trail connects the neighborhoods and parkland.

Getting Started
Performing "Community Assessments"

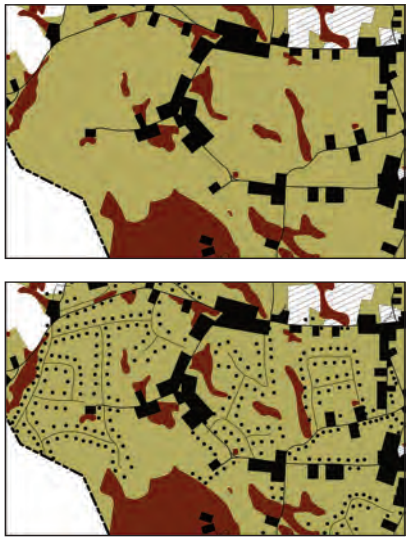

Figure 2 ***Conventional Buildout***
A matching pair of graphics, taken from an actual "build-out map," showing existing conditions (mostly undeveloped land) contrasted with the potential development pattern of "checkerboard suburbia" created through conventional zoning and subdivision regulations.

A "Community Assessment" helps local officials and residents see the ultimate result of continuing to implement current land-use policies. The process helps start discussions about how current trends can be modified so that a greener future is ensured.

Unfortunately, most communities with standard zoning and subdivision codes face a future in which every unprotected acre of buildable land is systematically converted into developed uses.

Most local ordinances allow or encourage standardized layouts of "wall-to-wall houselots." Over a period of decades this process produces a broader pattern of "wall-to-wall subdivisions." No community actively plans to become a bland suburb without open space. However, most zoning codes program exactly this outcome (see ***Figure 2***). Local officials can actually achieve goals of Comprehensive and Open Space plans by encouraging more compact development, or "conservation subdivisions" that incorporate the special places a community wishes to see conserved. Those places are often natural areas such as woodlands, streams, habitat and passive recreational areas (see ***Figure 3***) or they may be working and historic landscapes (see ***Figure 4***).

Municipalities can perform assessments to see the future before it happens, so that they will be able to judge whether a mid-course correction is needed. A Community Assessment entails an evaluation of the land-use regulations that are currently on the books, identifying their strengths and weaknesses and offering constructive recommendations about how they can incorporate the conservation techniques described in this booklet. It also includes a realistic appraisal of the extent to which private conservation efforts are likely to succeed in protecting lands from development through various nonregulatory approaches such as purchases or donations of easements or fee title interests.

Figure 3
Garnet Oaks, Bethel Township, Delaware County. The centerpiece of Garnet Oaks' open space is the near mile-long trail, which winds its way through the wooded, 24-acre conservation area, connecting a playground and quiet picnic grove to the street system. Without the conservation subdivision approach, the woodland and trails would have been cleared for larger lawns and longer streets.
Developer: Realen Homes

Figure 4
Farmview, Lower Makefield Township, Bucks County. The developer donated 145 acres of farmland to the Lower Makefield Farmland Preservation Corporation, a local land trust, enabling the Township to advance farmland preservation goals at no cost to residents. Premiums added to the "view lots" abutting the protected fields also contributed to the project's profitability.
Developer: Realen Homes

Three interrelated documents—the Comprehensive Plan, Zoning Code and Subdivision and Land Development Code, stand together like a three-legged stool providing a balanced footing for achieving a municipality's conservation goals.

Conservation Planning
A Map of Potential Conservation Lands

Although many communities have adopted either Comprehensive Plans or Open Space Plans containing detailed inventories of their natural and historic resources, very few have taken the next logical step of pulling together a composite *Map of Potential Conservation Lands*.

Such a map adopted as policy is vitally important to any community interested in conserving an interconnected network of open space. The map serves as the tool which guides decisions regarding which land to protect in order for the network to eventually take form and have substance.

A *Map of Potential Conservation Lands* starts with information contained in the community's existing planning documents. The next task is to identify two kinds of resource areas. *Primary Conservation Areas* comprise only the most severely constrained lands, where development is typically restricted under current codes and laws, such as wetlands, floodplains, and slopes exceeding 25%. *Secondary Conservation Areas* include all other locally noteworthy or significant features of the natural or cultural landscape, such as mature woodlands, wildlife habitats and travel corridors, prime farmland, groundwater recharge areas, greenways and trails, river and stream corridors, historic sites and buildings, and scenic viewsheds. These *Secondary Conservation Areas* are often best understood by the local residents who may be directly involved in their identification. Usually these secondary resource areas are totally unprotected and are simply zoned for one kind of development or another.

A base map is then prepared on which the *Primary Conservation Areas* have been added to an inventory of lands which are already protected (such as parks, land trust preserves, and properties under conservation easement). Overlay sheets showing each kind of *Secondary Conservation Area* are then laid on top of the base map in an order reflecting the community's preservation priorities (as determined through public discussion).

This overlay process will reveal certain situations where two or more conservation features appear together (such as woodlands and wildlife habitats, or farmland and scenic viewsheds). It will also reveal gaps where no features appear.

Although this exercise is not an exact science, it frequently helps local officials and residents visualize how various kinds of resource areas are connected to one another, and enables them to tentatively identify both broad swaths and narrow corridors of resource land that could be protected in a variety of ways.

Figure 5 shows a portion of a township map illustrating this approach.

The techniques which can best implement the community-wide *Map of Potential Conservation Lands* are Conservation Zoning and Conservation Subdivision Design. These techniques work hand in hand. Conservation Zoning expands the range of development choices available to landowners and developers. Just as importantly, it also eliminates the destructive option of creating full-density "checkerboard" layouts converting all land within new subdivisions into houselots and streets.

The second technique, "Conservation Subdivision Design," preserves half or more of the buildable land area within a residential development as undivided permanent open space. Not surprisingly, the first and most important step in designing a conservation subdivision is to identify the land to be preserved. By using the community-wide *Map of Potential Conservation Lands* as a template for the layout and design of conservation areas within new subdivisions, these developments help to create an interconnected network of open space spanning the entire municipality.

Figure 6 shows how the open space in several adjoining subdivisions has been designed to connect, and illustrates the way in which the *Map of Potential Conservation Lands* can become a reality.

Figure 5
Excerpt from a *Map of Potential Conservation Lands.*

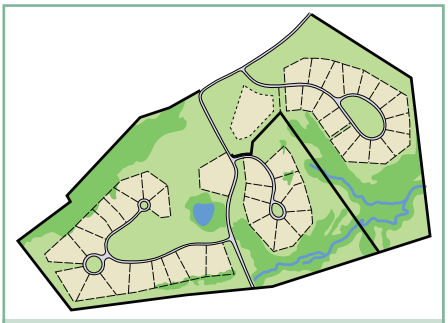

Figure 6
Marshall Pond and Marshall View, Wallace Township, Chester County. The conservation lands (shown in green) in these three adjoining subdivisions form part of an interconnected network of open space in Wallace Township, Chester County.

Conservation Zoning
A "Menu" of Choices

The main reason subdivisions typically consist of nothing more than houselots and streets is that most local land-use ordinances ask little, if anything, with respect to conserving open space or providing neighborhood amenities (see ***Figure 6***).

Communities wishing to break the cycle of "wall-to-wall houselots" need to consider modifying their zoning to actively and legally encourage subdivisions that set aside at least 50% of the land as permanently protected open space and to incorporate substantial density disincentives for developers who do not conserve any significant percentage of land.

Following this approach, a municipality would first determine the number of units permitted (density) by conventional zoning, using a yield plan (***Figure 7: Yield Plan***). A formula which subtracts environmentally constrained land may also be used, thereby basing density on the site's capacity to support development. Under either approach, a developer would then be permitted full density *only if* at least 50% of the buildable land is maintained as undivided open space (***Figure 8: Option 1***). Another full density option would include a 25% density bonus for the development of an "age-targeted" community preserving at least 60% of the buildable land (***Figure 9: Option 2***).

Developers wishing to serve the "estate lot" market have two additional options. One involves lots containing at least four acres of unconstrained land (***Figure 10: Option 3***). The other permits "country properties" of at least 10 acres, which may be accessed by gravel drives built to new township standards for very low-volume rural lanes (***Figure 11: Option 4***). An additional incentive to encourage developers to choose this fourth option may be permission to build up to two accessory dwellings on these properties. Those units would be limited in size, subject to architectural design standards to resemble outbuildings on a traditional estate, and restricted from being separately subdivided.

It is noteworthy that the 36 village-like lots in ***Option 5*** (see ***Figure 12***) occupy less land than the 18 lots in ***Option 1***, and that ***Option 5*** therefore contributes more significantly to the goal of creating community-wide networks of open space. The village-scale lots in ***Option 5*** are particularly popular with empty-nesters, single-parent households, and couples with young children. Their layout is based on that of historic hamlets and villages in the region. New developments in this category could be controlled as Conditional Uses subject to illustrated design standards.

Two or more of these options could be combined on a single large property. One logical approach would combine ***Options 1*** and ***4***, with the ***Option 4*** "country properties" comprising part of the required

Figure 7 ***Yield Plan***
Conventional Development Pattern
18 Lots
Min. Lot Size: 80,000 sq. ft.
No Undivided Open Space

Figure 8 ***Option 1***
Density-neutral
18 Lots
Lot Size Range: 20,000 to 40,000 sq. ft.
50% Undivided Open Space

Figure 9 ***Option 2***
Age-targeted Community
25% Density Increase
24 Lots
Lot Size: 12,000 to 24,000 sq. ft.
60% Undivided Open Space

Figure 10 ***Option 3***
Estate Lots
50% Density Reduction
9 Lots
Typical Lot Size:
160,000 sq. ft. (±4 acres)
No common
open space required

Figure 11 ***Option 4***
Country Properties
70% Density Reduction
5 Lots
Maximum Density:
10 acres per
principal dwelling
No common
open space required

Figure 12 ***Option 5***
Hamlet or Village
Double Density
36 Lots
Lot Size Range:
6,000 to 12,000 sq. ft..
70% Undivided
Open Space

open space in a conservation subdivision (see ***Figure 13***).

Conspicuously absent from this menu of choices is the conventional full-density subdivision providing no unfragmented open space (***Figure 7***). Because that kind of development causes the largest loss of resource land and poses the greatest obstacle to conservation efforts, it is not included as an option under this approach.

For illustrative purposes, this booklet uses a density of one dwelling unit per 80,000 square feet. However, Conservation Zoning is equally applicable to higher density zoning districts of one, three or four units per acre. Such densities typically occur in villages, boroughs, urban growth boundary areas and TDR receiving areas where open space is critical to the residents' quality of life. In such higher density situations, the open space percentage typically ranges between 25–35%, in addition to unbuildable lands.

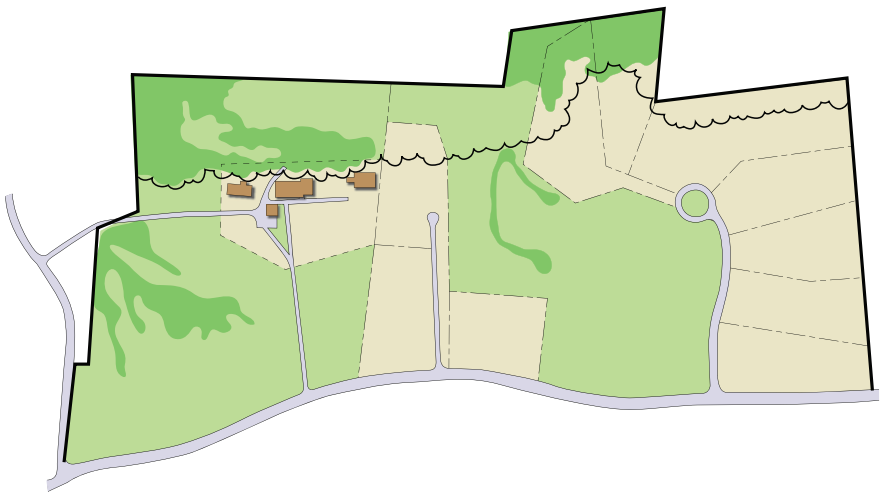

Figure 13
The Preserve at Birch Run, West Vincent Township, Chester County. An ***Option 1*** conservation subdivision arranges homes around eight acres of common open space. In addition, a historic horse farm was preserved on a 15-acre "country property" lot (***Option 4***). Up to 80% of a country property can count toward required open space.
Developer: Woodstone Homes

Conservation Subdivision Design

A Four-Step Process

Designing subdivisions around the central organizing principle of land conservation is not difficult. However, it is essential that ordinances contain clear standards to guide the Conservation Design process. The four-step approach described below has been proven to be effective in laying out new full-density developments where all the significant natural and cultural features have been preserved.

Step One consists of identifying the land that should be permanently protected. The developer incorporates areas pre-identified on the community-wide *Map of Potential Conservation Lands* and then performs a detailed site analysis in order to precisely locate features to be conserved. The developer first identifies all the constrained lands (wet, floodprone, and steep), called *Primary Conservation Areas* (***Figure 14***). He then identifies *Secondary Conservation Areas* (***Figure 15***) which comprise noteworthy features of the property that are typically unprotected under current codes: mature woodlands, greenways and trails, stream corridors, prime farmland, hedgerows and individual trees or tree groups, wildlife habitats and travel corridors, historic sites and structures, scenic viewsheds, etc. This is also the time to identify those soils best suited for sanitary sewer and stormwater management facilities. After "greenlining" the features to be saved, the remaining part of the property becomes the *Potential Development Area* (***Figure 16***).

Step Two involves locating sites for individual houses within the *Potential Development Area* so that their views of the open space are maximized (***Figure 17***). The number of houses is a function of the density permitted within the zoning district, as shown on a ***Yield Plan*** (***Figure 7***).

Step Three simply involves "connecting the dots" with streets and informal trails (***Figure 18***), while **Step Four** consists of drawing in the lot lines (***Figure 19***).

This approach reverses the sequence of steps taken in laying out conventional subdivisions, where the street system is the first thing to be designed, followed by lot lines fanning out to encompass every square foot of ground into houselots. When municipalities require nothing more than "houselots and streets," that is all they receive. But by setting community standards higher and requiring 50 to 70% open space as a precondition for achieving full density, officials can effectively encourage Conservation Subdivision Design. The protected land in each new subdivision would then become building blocks that add new acreage to community-wide networks of interconnected open space.

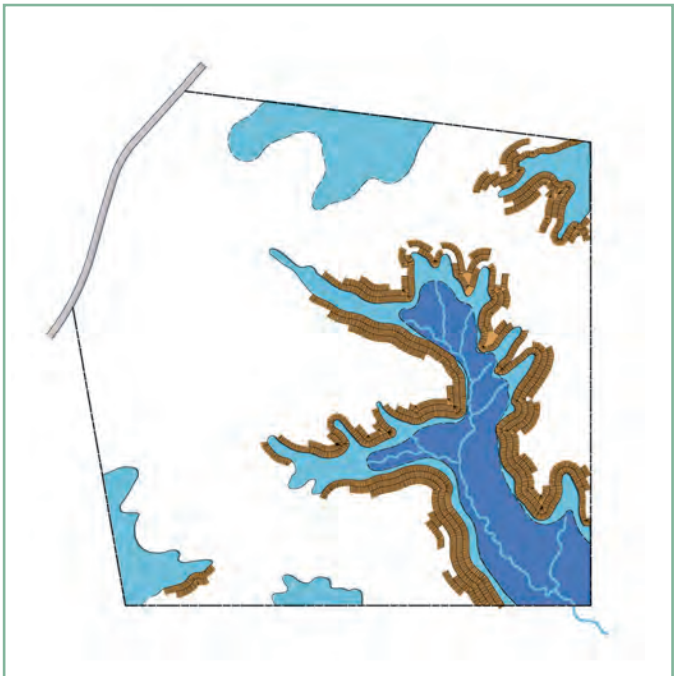

Figure 14 ***Primary Conservation Areas***
Wetlands, floodplain, steepslopes

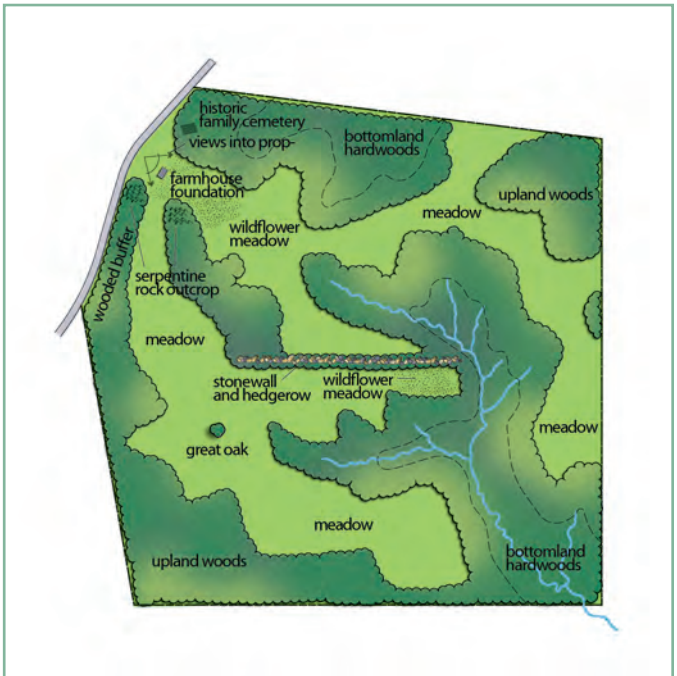

Figure 15 ***Secondary Conservation Areas***
These special features constitute a significant asset to the property value and neighborhood character. They are the most vulnerable to change, but can easily be retained through Conservation Design.

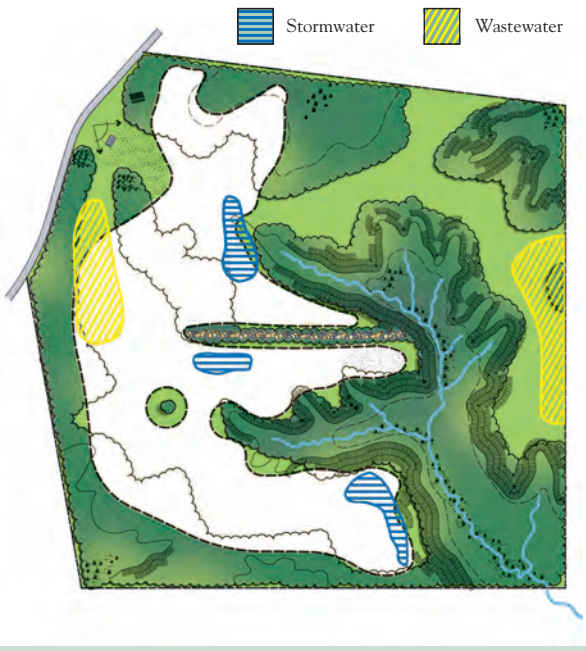

Figure 16 ***Step One***
Delineating greenway land, stormwater and wastewater locations and potential development areas for ***Options 1***, ***2***, and ***5***

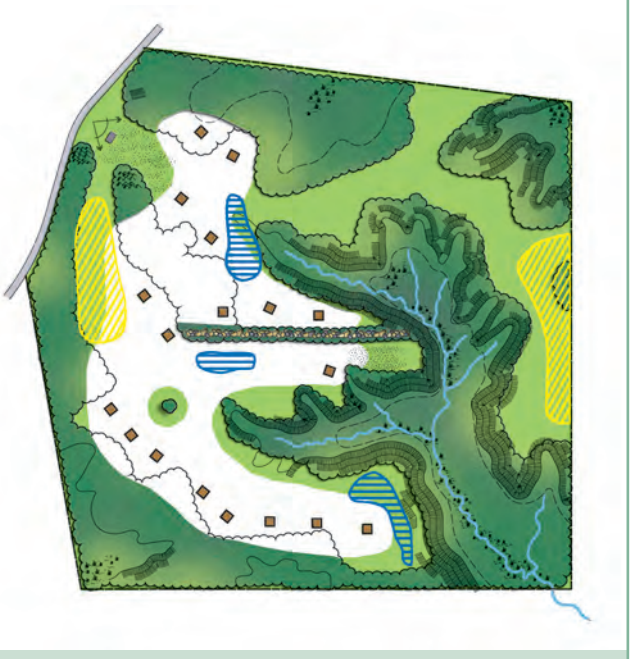

Figure 17 ***Step Two***
Locating House Sites

Figure 18 ***Step Three***
Aligning Streets and Trails

Figure 19 ***Step Four***
Drawing in the Lot Lines

Frequently Asked Questions
About Conservation Subdivision Design

Does this conservation-based approach involve a "taking"?

No. People who do not fully understand this conservation-based approach to subdivision design may mistakenly believe that it constitutes "a taking of land without compensation." This misunderstanding may stem from the fact that conservation subdivisions, as described in this booklet, involve either large percentages of undivided open space or lower overall building densities.

There are two reasons why this approach does not constitute a "taking."

First, no density is taken away. Conservation Zoning is fundamentally fair because it allows landowners and developers to achieve full density under the municipality's current zoning—and even to increase that density significantly—through several different "as-of-right" options. Of the five options permitted under Conservation Zoning, three provide for either full or enhanced densities. The other two options offer the developer the choice to lower densities and increase lot sizes. Although Conservation Zoning precludes full-density layouts that do not conserve open space, this is legal because there is no constitutional "right to sprawl."

Second, no land is taken for public use. None of the land which is required to be designated for conservation purposes becomes public (or even publicly accessible) unless the landowner or developer wants it to be. In the vast majority of situations, municipalities themselves have no desire to own and manage such conservation land, which they generally feel should be a neighborhood responsibility. In cases where local officials wish to provide township recreational facilities (such as ballfields or trails) within conservation subdivisions, the municipality must negotiate with the developer for the purchase of that land on a "willing seller/willing buyer" basis. To facilitate such negotiations, Conservation Zoning ordinances can be written to include density incentives to encourage developers to designate specific parts of their conservation land for public ownership or for public access and use.

A legal analysis of the *Growing Greener* workbook, by Harrisburg land use attorney Charles E. Zaleski, Esq., is reprinted on the last page of this booklet. The model ordinance was updated in 2008 and reviewed by attorney George Asimos of Saul Ewing, LLP, Wayne, Pennsylvania.

How can a community ensure permanent protection for conservation lands?

The most effective way to ensure that conservation land in a new subdivision will remain undeveloped forever is to place a permanent conservation easement on it. Such easements run with the chain of title, in perpetuity, and specify the various conservation uses that may occur on the property. These restrictions are separate from zoning ordinances and continue in force even if zoning changes permit higher densities in future years. Easements are typically held by land trusts and units of government. Since political leadership can change over time, land trusts are the most reliable holder of easements, as their mission never varies. Deed restrictions and covenants are, by comparison, not as effective as easements, but are sometimes useful for small areas of open space. Easements can be modified only within the spirit of the original agreement, and only if the co-holders agree. In practice, while a proposal to erect another house or a country club building on the open space would typically be denied, permission to create a small ballfield or a single tennis court in a corner of a large conservation meadow or former field might well be granted.

What are the ownership, maintenance, tax and liability issues?

When considering subdivisions which conserve open space, officials often ask who will be responsible for the potential liability and payment of property taxes. The short answer is that whoever owns the conservation land is responsible for all of the above.

Ownership Choices

There are basically four options, which may be combined within the same subdivision where that makes the most sense.

- *Individual Landowner*
  At its simplest level, the original landowner (a farmer, for example) can retain ownership to as much as 80% of the conservation land. At least 20% of the open space should be reserved for common neighborhood use by subdivision residents. That landowner can also pass this property on to sons or daughters, or sell it to other individual landowners, with permanent conservation easements running with the land and protecting it from development under future owners. *The open space should* ***not****, however, be divided among all of the individual subdivision lots as land management and access difficulties are likely to arise.*
- *Homeowners' Associations*
  Most conservation land within subdivisions is owned and managed by

homeowners' associations (HOAs). A few basic ground rules encourage a good performance record. First, membership must be automatic, a precondition of property purchase in the development. Second, zoning should require that bylaws give such associations the legal right to place liens on properties of members who fail to pay their dues. Third, facilities should be minimal (ballfields and trails rather than clubhouses and swimming pools) to keep annual dues low. And fourth, detailed maintenance plans for conservation areas should be required by the municipality as a condition of approval. The municipality has enforcement rights and may place a lien on the property should the HOA fail to perform its obligations to maintain the conservation land.

- *Land Trusts*
  Although homeowners' associations are generally the most logical owners of conservation land within subdivisions, occasionally situations arise where such ownership most appropriately resides with a land trust (such as when a particularly rare or significant natural area is involved). Land trusts are private, charitable groups whose principal purpose is to protect land under its stewardship from inappropriate change. Their most common role is to hold easements or fee simple title on conservation lands within new developments and elsewhere in the community, to ensure that all restrictions are observed. To cover their costs in maintaining land they own or in monitoring land on which they hold easements, land trusts typically require some endowment funding.

- *Municipality or Other Public Agency*
  In special situations a local government might desire to own part of the conservation land within a new subdivision, such as when that land has been identified in a municipal open space plan as a good location for a neighborhood park or for a link in a community trail network. Developers can often be encouraged to sell or donate certain areas to municipalities.

- *Combinations of Owners*
  As illustrated in ***Figure 20***, the conservation land within new subdivisions could involve multiple ownerships, including "non-common" open space such as cropland retained by the original farmer, common open space such as ballfields owned by an HOA, and a trail corridor owned by either a land trust or by the municipality.

Maintenance Issues

Local officials should require conservation area management plans to be submitted and approved prior to granting final subdivision approval. In order to assist communities and developers in managing conservation areas, Natural Lands Trust has published a *Stewardship Handbook for Natural Areas in Southeastern Pennsylvania* (available at **www.natlands.org**) that identifies different kinds of conservation areas (from woodlands and pastures to ballfields and abandoned farmland) and describes recommended management practices for each one. Farmland is typically leased by HOAs and land trusts to local farmers, who often agree to modify some of their agricultural practices to minimize impacts

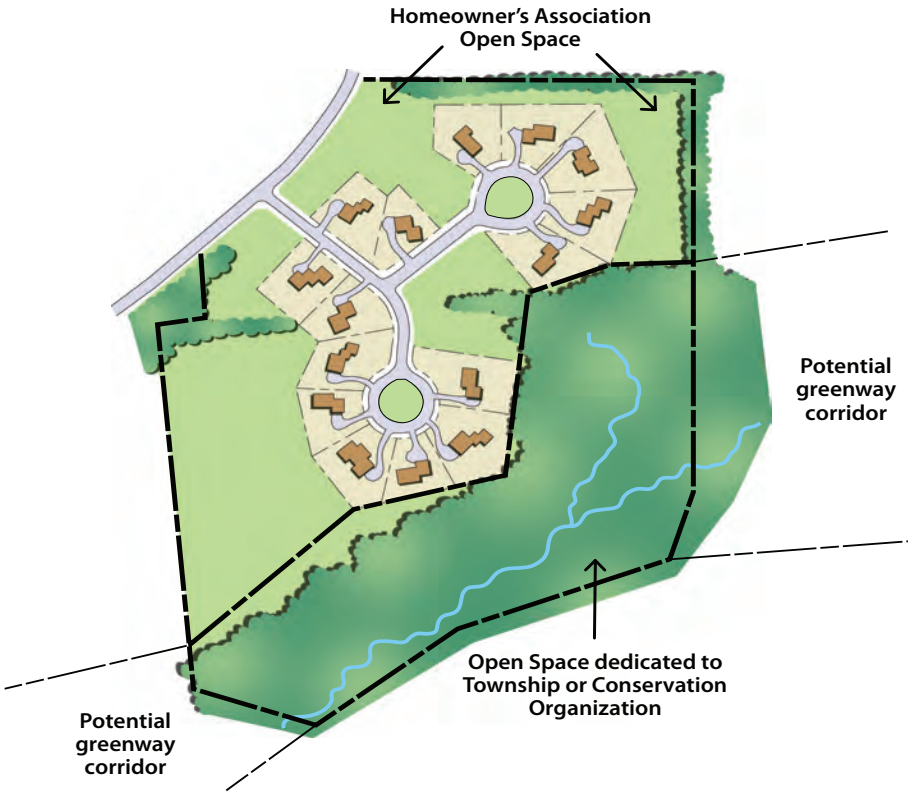

Figure 20 ***Multiple Ownerships***
Various private and public entities can own different parts of the open space within conservation subdivisions, as illustrated above.

on nearby residents. Although ballfields and village greens require weekly mowing, conservation meadows typically need only annual mowing. Woodlands generally require the least maintenance: trimming bushes along walking trails, and removing invasive vines around the outer edges where greater sunlight penetration favors their growth.

Tax Concerns

Property tax assessments on conservation subdivisions should not differ, in total, from those on conventional developments. This is because the same number of houses and acres of land are involved. In both cases the rate is similar to that applied to land in conventional subdivisions where the larger houselots are not big enough to be further subdivided. (For example, the undeveloped back half of a one-acre lot in a one-acre zoning district is subject to minimal taxation because it has no further development value.)

Liability Questions

The Pennsylvania Recreation Use of Land and Water Act protects owners of undeveloped land from liability for negligence if the landowner does not charge a fee to recreational users. A tree root or rock outcropping along a trail that trips a hiker will not constitute landowner negligence. To be sued successfully in Pennsylvania, landowners must be found to have "willfully or maliciously failed to guard against a dangerous condition." This is a much more difficult case for plaintiffs to make. Even so, to cover themselves against such situations, owners of conservation lands routinely purchase liability insurance policies similar to those that most homeowners maintain.

How can on-site sewage disposal work with conservation subdivisions?

The conventional view is that the smaller lots in conservation subdivisions make them more difficult to develop in areas without sewers. However, the reverse is true. The flexibility inherent in the design of conservation subdivisions makes them superior to conventional layouts in their ability to provide for adequate sewage disposal. Here are two examples:

Utilizing the Best Soils

Conservation design requires the most suitable soils on the property to be identified at the outset, enabling houselots to be arranged to take the best advantage of them. If one end of a property has deeper, better drained soils, it makes more sense to site the homes in that part of the property rather than to spread them out, with some lots located entirely on mediocre soils that barely manage to meet minimal standards for septic approval.

Locating Individual Systems within the Open Space

Conventional wisdom also holds that when lots become smaller, central water or sewage disposal is required. That view overlooks the practical alternative of locating individual wells and/or individual septic systems within the permanent open space adjacent to the more compact lots typical of conservation subdivisions, as shown in ***Figure 21***.

There is no engineering reason to require that septic absorption areas must be located within each houselot. However, it is essential that the final approved subdivision plan clearly indicate which parts of the undivided open space are designated for septic disposal, with each lot's disposal field marked. These absorption areas can be located under conservation meadows in the same way they typically occupy positions under suburban lawns. If mound systems are required due to marginal soil conditions, they are best located in passive use areas such as conservation meadows where the grass is cut only once a year. Such mounds should also be required to be contoured with gently sloping sides to blend into the surrounding landscape as much as possible.

Although maintenance and repair of these septic systems remains the responsibility of individual lot owners, it is recommended that HOAs be authorized to pump individual septic tanks on a regular basis (at least every three years) to ensure that the accumulated sludge never rises to a level where it can flow into and clog the absorption fields. This inexpensive, preventive maintenance greatly extends the life of the system.

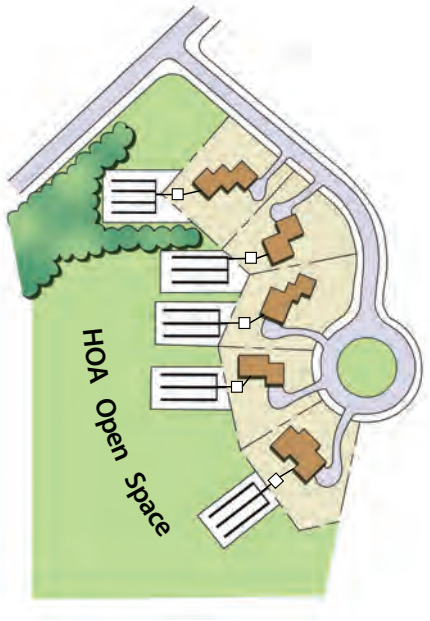

Figure 21 ***Septic Systems in Common Open Space***

A practical alternative to central water or sewage disposal facilities are individually-owned wells and/or septic systems located within conservation areas, in places specifically designated for them on the final plan.

Figure 22

Foreground meadows provide attractive buffers between new homes and existing roads. Homes located along a single-loaded street typically look out over a meadow (***right***), so that the view from the township road is one of a large grassy area and house fronts, not rear elevations (***left***). This arrangement ensures backyard privacy and avoids expensive artificial berms.

How does this conservation approach differ from "clustering"?

The *Growing Greener* conservation approach described here differs dramatically from the kind of "clustering" that has occurred in many communities over the past several decades. The points of difference are as follows:

Higher Percentage and Quality of Open Space

In contrast with typical cluster codes, Conservation Zoning establishes higher standards for both the quantity and quality of open space that is to be preserved. Under Conservation Zoning, 50 to 70% of the *unconstrained* land is permanently set aside. This compares with cluster provisions that frequently require only 25 to 30% of the *gross* land area be conserved. That minimal open space often includes all of the most unusable land as open space, and sometimes also includes undesirable, left-over areas such as stormwater management facilities and land under high-tension power lines.

Open Space Pre-Determined to Form Community-wide Conservation Network

Although clustering has at best typically produced a few small "green islands" here and there in any municipality, Conservation Zoning can protect blocks and corridors of permanent open space. These areas can be pre-identified on a comprehensive plan *Map of Potential Conservation Lands* so that each new development will add to—rather than subtract from—the community's open space acreage.

Eliminates the Standard Practice of Full-Density with No Open Space

Under this new system, full density is achievable for layouts in which 50% or more of the unconstrained land is conserved as permanent, undivided open space. By contrast, cluster zoning provisions are typically only optional alternatives within ordinances that permit full density, by right, for standard "cookie-cutter" designs with no open space. As long as developers are given the option of full-density, by right conventional layouts without open space, the vast majority will continue to opt for that more familiar design—to the community's detriment.

How do residential values in conservation subdivisions compare to conventional subdivisions?

In conservation subdivisions with substantial open space, there is little or no correlation between lot size and price. These developments have sometimes been described as "golf course communities without the golf course," underscoring the idea that a house on a small lot with a great view is frequently worth as much or more than the same house on a larger lot which is boxed in on all sides by other houses.

It is a well-established fact of real estate that people pay more for park-like settings, which offset their tendency to pay less for smaller lots. Successful developers know how to market homes in conservation subdivisions by emphasizing the open space. Rather than describing a house on a half-acre lot as such, the product is described as a house with 20 and one-half acres, the larger figure reflecting the area of conservation land that has been protected in the development. When that conservation area abuts other similar land, as in the township-wide open space network, a further marketing advantage exists.

ECKERT SEAMANS CHERIN & MELLOTT
ATTORNEYS AT LAW

October 16, 1997

Randall G. Arendt, Vice President
Conservation Planning
Natural Lands Trust, Inc.
1031 Palmers Mill Road
Media, PA 19063

Re: Conservation Planning Documents and
Growing Greener Workbook

Dear Mr. Arendt:

I have had the opportunity to review the *Growing Greener* workbook and the proposed conservation planning concepts set forth in that workbook for compliance with the provisions of the United States Constitution, the Pennsylvania Constitution, and the Pennsylvania Municipalities Planning Code (the "MPC"). In my opinion, the conservation planning concepts as set forth in the *Growing Greener* workbook are constitutional land use control concepts and the provisions comport with the requirements of the Pennsylvania Municipalities Planning Code.

The subdivision concept which provides for a conceptual preliminary plan and standards for that plan is authorized specifically under the MPC as part of the two-stage planning process allowed by Section 503(1) of the MPC. The Zoning Ordinance concept utilizes a multi-tiered zoning system with options available to the landowner under the Zoning Ordinance. Such a device is specifically authorized under Section 605 of the MPC which specifically encourages innovation and promotion of flexibility, economy and ingenuity in development based upon express standards and criteria. The proposed ordinances contained in the workbook satisfy that specific requirement.

The provisions of both the United States Constitution and the Pennsylvania Constitution require that the land use regulations be reasonable and be intended to benefit the public health, safety and welfare. The concept of providing a variety of options for choices by the landowner meets both the reasonableness and public purpose tests of constitutionality. The benefit of the *Growing Greener* concept is that there will be a greater amount of usable open space, while at the same time the landowners will be able to make reasonable use of their property under the options available as proposed in the workbook.

Individual municipalities within the Commonwealth of Pennsylvania will have to apply the concepts and will have to establish their own densities based upon the unique circumstances in each particular municipality. There can be no guarantee that all such ordinances will be constitutional unless they satisfy the requirements of being reasonable with regard to the locational circumstances of the particular property and community in question. However, it is my opinion that if the concepts and procedures set forth in the *Growing Greener* workbook are followed and that the densities and requirements reflect the unique circumstances of the individual municipality, that the *Growing Greener* concept is lawful and constitutional in the Commonwealth. The concepts set forth in the *Growing Greener* workbook provide a new method of addressing the pressures of growth and development throughout both the urban and rural portions of the Commonwealth of Pennsylvania, and I urge the municipal officials to give full consideration to these exciting new concepts.

Very truly yours,

Charles E. Zaleski

Charles E. Zaleski

CEZ/jr

"I've never had the opportunity to just walk around a site and talk informally with officials before submitting an engineered plan. It saved me time, money and aggravation."

Chip Vaughan, Vaughan Builders

"These ordinances have made a very significant difference for us."

Jim Wendelgass, Township Manager

"We don't butt heads with developers anymore; it's a smoother process."

Andy Paravis, Township Supervisor

Thank you to the officials from over 150 Pennsylvania municipalities, who have worked with Natural Lands Trust under the *Growing Greener: Conservation by Design* program since 1997! We also thank the following foundations and agencies for contributions over the years:

Pennsylvania Department of Conservation and Natural Resources

The William Penn Foundation

The Alexander Stewart, MD Foundation

The Heinz Endowments

Pennsylvania Department of Community and Economic Development

Pennsylvania Department of Environmental Protection

The United States Environmental Protection Agency Chesapeake Bay Program

Natural Lands Trust

Natural Lands Trust is eastern Pennsylvania's largest conservation organization, saving thousands of acres of forests, fields, streams, and wetlands each year. Since 1953, we have worked to protect the beauty of our region's natural lands for current and future generations by preserving and promoting healthy habitats for native plants and animals, clean watersheds for people and wildlife, and unspoiled areas for public enjoyment.

Hildacy Farm ~ 1031 Palmers Mill Road ~ Media, PA 19063
610-353-5587 ~ www.natlands.org